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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/532,933	04/27/2005	Theo Anjes Maria Ruijl	NL 021065	3115
24737	7590	04/26/2006	EXAMINER	
PHILIPS INTELLECTUAL PROPERTY & STANDARDS P.O. BOX 3001 BRIARCLIFF MANOR, NY 10510			COHEN, AMY R	
			ART UNIT	PAPER NUMBER
			2859	

DATE MAILED: 04/26/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/532,933

Applicant(s)

RUIJL ET AL.

Examiner

Amy R. Cohen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-13 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-13 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 27 April 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  - ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |   |  |
|---|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)            |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>12/12/05</u> | 6) <input type="checkbox"/> Other: ____  |

## DETAILED ACTION

### *Specification*

1. This application does not contain an abstract of the disclosure as required by 37

CFR 1.72(b). An abstract on a separate sheet is required.

2. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

### *Claim Objections*

3. Claims 4, 12 are objected to because of the following informalities:

Claim 4, line 4, "bein" should read being.

Claim 12 is dependent from claim 10 (according to the amended sheet), however, claim 12 also claims subject matter which is introduced in claim 11, which is not dependent on claim 10. For purposes of prosecution, Examiner interprets claim 12 to be dependent on claim 11. The term "said plate" in line 3 is considered to have lack of antecedent basis in the claims and will be read as a plate.

Appropriate correction is required.

### *Claim Rejections - 35 USC § 102*

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

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A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 1, 4, 6, 9, 11-13 are rejected under 35 U.S.C. 102(b) as being anticipated by Aehnelt et al. (U. S. Patent No. 5,111,592).

Regarding claims 1, 4, 6, 9, 11, 12: Aehnelt et al. teaches a coordinate measuring device having a probe (Fig. 5) comprising a stylus (45) with a sensing member (46) for contacting the object to be measured, a support unit to which the stylus is connected through elastic means (53a-c), and magnet means (47, 51) for damping vibrations of the stylus by generating eddy currents in conductive material (Col 3, lines 28-35, Col 5, line 60-Col 6, line 28), characterized in that the elastic means comprise at least one leaf spring (53a-c) made of conductive material, and in that said magnet means generate eddy currents in said leaf spring (Col 3, lines 28-35, Col 5, line 60-Col 6, line 28).

Aehnelt et al. teaches the coordinate measuring device characterized in that a leaf spring (13a-c, 53a-c) comprises two portions positioned inclined to each other, an outer portion being connected to the support unit and an inner portion being connected to the stylus (Figs. 1-3, 5, Col 4, lines 39-64, Col 5, line 60-Col 6, line 23).

Aehnelt et al. teaches the coordinate measuring device characterized in that the configuration of leaf springs is rotationally symmetrical, having an axis of symmetry perpendicular to the plane of the leaf springs (Col 4, lines 39-64).

Aehnelt et al. teaches the coordinate measuring device characterized in that the magnetic means (47) comprise a number of permanent magnets (Fig. 5, Col 5, lines 65-68).

Aehnelt et al. teaches the coordinate measuring device characterized in that the permanent magnets are positioned in an array adjacent to each other (Fig. 5, Col 5, lines 65-68).

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Aehnelt et al. teaches the coordinate measuring device characterized in that the magnetic axes of said permanent magnets are positioned in the plane of a plate (42) and perpendicular to the array (Fig. 5, Col 5, line 60-Col 6, line 28).

Regarding claim 13: Aehnelt et al. teaches a method of measuring the position of an object, whereby the object is contacted by a stylus (45) of a probe, the probe comprising the stylus with a sensing member (46), a support unit (Fig. 5) to which the stylus is connected through elastic means (53a-c), and magnetic means (47, 51) for damping vibrations of the stylus by generating eddy currents in conductive material (Col 3, lines 28-35, Col 5, line 60-Col 6, line 28), characterized in that the elastic means comprise at least one leaf spring (53a-c) made of conductive material (Col 3, lines 28-35, Col 5, line 60-Col 6, line 28), and in that said magnet means generate eddy currents in said leaf spring (Col 3, lines 28-35, Col 5, line 60-Col 6, line 28).

### ***Claim Rejections - 35 USC § 103***

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over Aehnelt et al. in view of Abiru et al. (U. S. Patent No. 4,187,614).

Aehnelt et al. discloses the coordinate measuring device as described above in paragraph

5.

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Aehnelt et al. does not disclose the coordinate measuring device characterized in that the elastic means comprise a number of leaf springs made of one sheet of material.

Abiru et al. discloses a coordinate measuring device characterized in that the elastic means comprise a number of leaf springs made of one sheet of material (Figs. 3b-j, Col 4, lines 24-65).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have the leaf springs of Aehnelt et al. comprise a number of leaf springs made of one sheet of material, as taught by Abiru et al., in order to decrease the resiliency of the leaf spring in the axial direction, thereby increasing the accuracy of the device (Abiru et al., Col 4, lines 24-29).

8. Claims 1-3, 7, 9, 10, 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Edenharter et al. (DE 3625636 A) in view of Linke (U. S. Patent No. 4,688,326).

Regarding claims 1-3, 7, 9, 10: Edenharter et al. discloses a coordinate measuring device having a probe (Fig. 1) comprising a stylus (not numbered) with a sensing member (16) for contacting an object to be measured (W), a support unit (1, 2) to which the stylus is connected through elastic means (8, 9), and magnet means (12) for damping vibrations of the stylus by generating eddy currents in conductive material (Abstract), characterized in that the elastic means comprise at least one leaf spring (8, 9), and in that said magnet means generate eddy currents (Abstract).

Edenharter et al. discloses the coordinate measuring device characterized in that the elastic means comprise two spaced-apart spring members (8, 9, Fig. 1, there are two of each springs 8 and 9), each comprising leaf springs (8, 9), and in that the magnet means (12) are located between the two spring members (Fig. 1, Abstract, the magnet means 12 is located on 11 which is central to each of the pairs of springs 8 and 9).

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Edenharter et al. discloses the coordinate measuring device characterized in that the magnet means comprise a number of permanent magnets (12, Abstract, two magnets 12 are present).

Edenharter et al. discloses the coordinate measuring device characterized in that the permanent magnets are incorporated in a plate (13) of nonmagnetic material.

Edenharter et al. does not disclose a coordinate measuring device wherein the at least one leaf spring specifically made of conductive material; wherein said conductive material is a nonmagnetic material; wherein the conductive material is aluminum or an aluminum alloy, or copper, or a copper alloy.

Linke discloses a device wherein the at least one leaf spring specifically made of conductive material (Col 5, lines 22-38); wherein said conductive material is a nonmagnetic material (Col 5, lines 22-38); wherein the conductive material is aluminum or an aluminum alloy, or copper, or a copper alloy (Col 5, lines 22-38).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have the leaf springs of Edenharter et al. be of a nonmagnetic material, as taught by Linke, in order to be made of a material which is sufficiently stiff to hold the stylus, and to be of a nonmagnetic material so that the leaf springs are only dampened by the eddy currents and do not react to the pull of the magnet itself.

Regarding claim 13: Edenharter et al. discloses a method of measuring the position of an object (W), whereby the object is contacted by a stylus of a probe (Fig. 1), the probe comprising the stylus with a sensing member (16), a support unit (1, 2) to which the stylus is connected through elastic means (8, 9), and magnet means (12) for damping vibrations of the stylus by generating eddy currents in conductive material (Abstract), characterized in that the elastic

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means comprise at least one leaf spring (8, 9), and in that said magnet means generate eddy currents (Abstract).

Edenharter et al. does not disclose a coordinate measuring device wherein the at least one leaf spring specifically made of conductive material (Col 5, lines 22-38).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have the leaf springs of Edenharter et al. be of a nonmagnetic material, as taught by Linke, in order to be made of a material which is sufficiently stiff to hold the stylus, and to be of a nonmagnetic material so that the leaf springs are only dampened by the eddy currents and do not react to the pull of the magnet itself.

9. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Edenharter et al. and Linke as applied to claims 1-3, 7, 9, 10, 13 above, and further in view of Abiru et al.

Edenharter et al. and Linke disclose the coordinate measuring device as described above in paragraph 8 and wherein the spring members (8, 9) are located parallel to each other (Fig. 1).

Edenharter et al. and Linke do not disclose the coordinate measuring device wherein each spring member comprises a number of leaf springs made out of one sheet of material.

Abiru et al. discloses that spring members may comprises a number of leaf springs made out of one sheet of material in order to decrease resiliency in one or more directions (Col 4, lines 24-29).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have the leaf springs of Edenharter et al. and Linke comprise a number of leaf springs made of one sheet of material, as taught by Abiru et al., in order to decrease the resiliency of the leaf spring in one or more directions, thereby increasing the accuracy of the device (Abiru et al., Col 4, lines 24-29).



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*Conclusion*

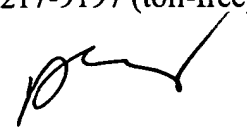
10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The following application and patents disclose coordinate measuring devices Brenner et al. (US PG PUB 2005/0229420), Brenner et al. (U. S. Patent No. 6,971,183), Fracheboud et al. (U. S. Patent No. 6,886,265), Ruck et al. (U. S. Patent No. 5,623,766), McMurtry et al. (U. S. Patent No. 5,345,689), Wiklund (U. S. Patent No. 5,326,982), Baxter (U. S. Patent No. 5,209,131), Asakawa (U. S. Patent No. 5,012,591), Juillerat (U. S. Patent No. 4,879,916), Maddock et al. (U. S. Patent No. 4,716,656), and Berchtold (U. S. Patent No. 4,601,111).

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Amy R. Cohen whose telephone number is (571) 272-2238. The examiner can normally be reached on 8 am - 5 pm, M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Diego F. Gutierrez can be reached on (571) 272-2245. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

ARC  
April 24, 2006



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